FIG. 1

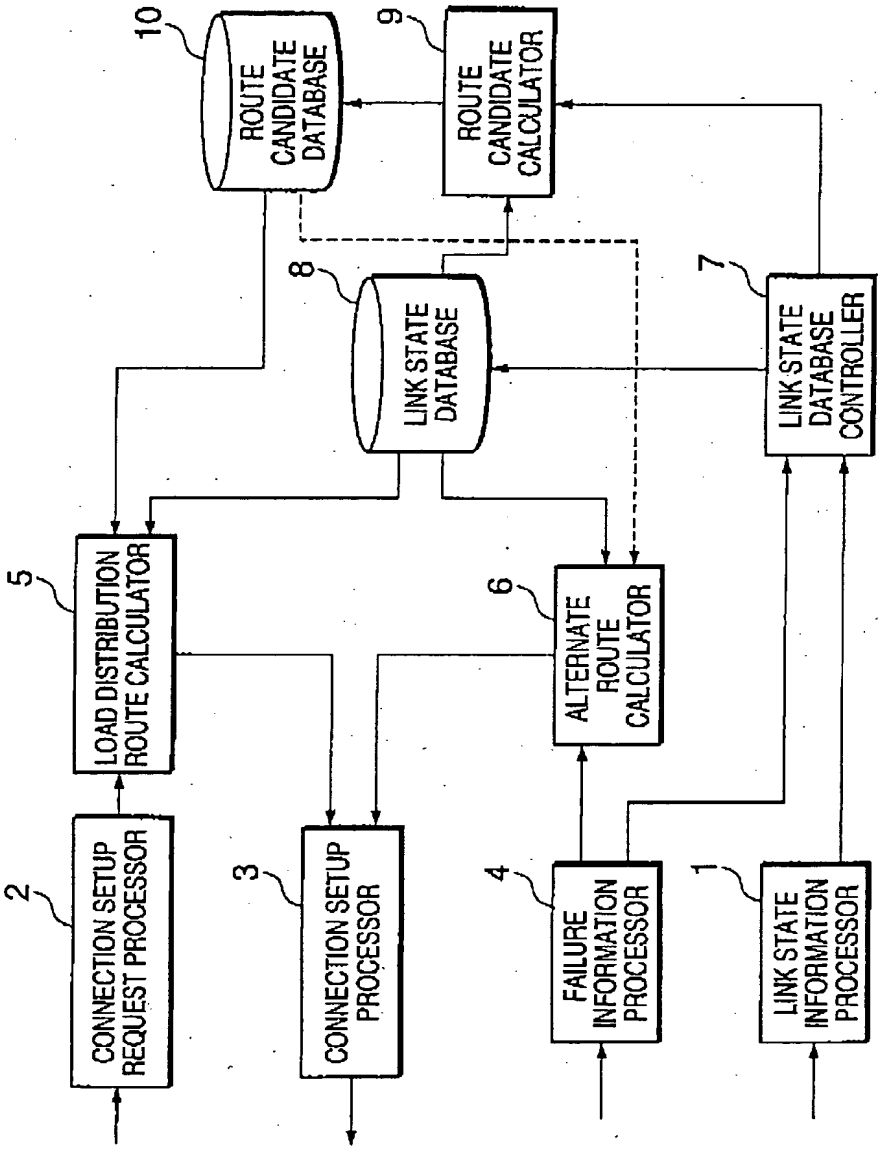
10
ROUTE CANDIDATE DATABASE
9
ROUTE CANDIDATE CALCULATOR
8
LINK STATE DATABASE
7
LINK STATE DATABASE CONTROLLER
5
LOAD DISTRIBUTION ROUTE CALCULATOR
6
ALTERNATE ROUTE CALCULATOR
2
CONNECTION SETUP REQUEST PROCESSOR
3
CONNECTION SETUP PROCESSOR
4
FAILURE INFORMATION PROCESSOR
1
LINK STATE INFORMATION PROCESSOR

FIG. 2

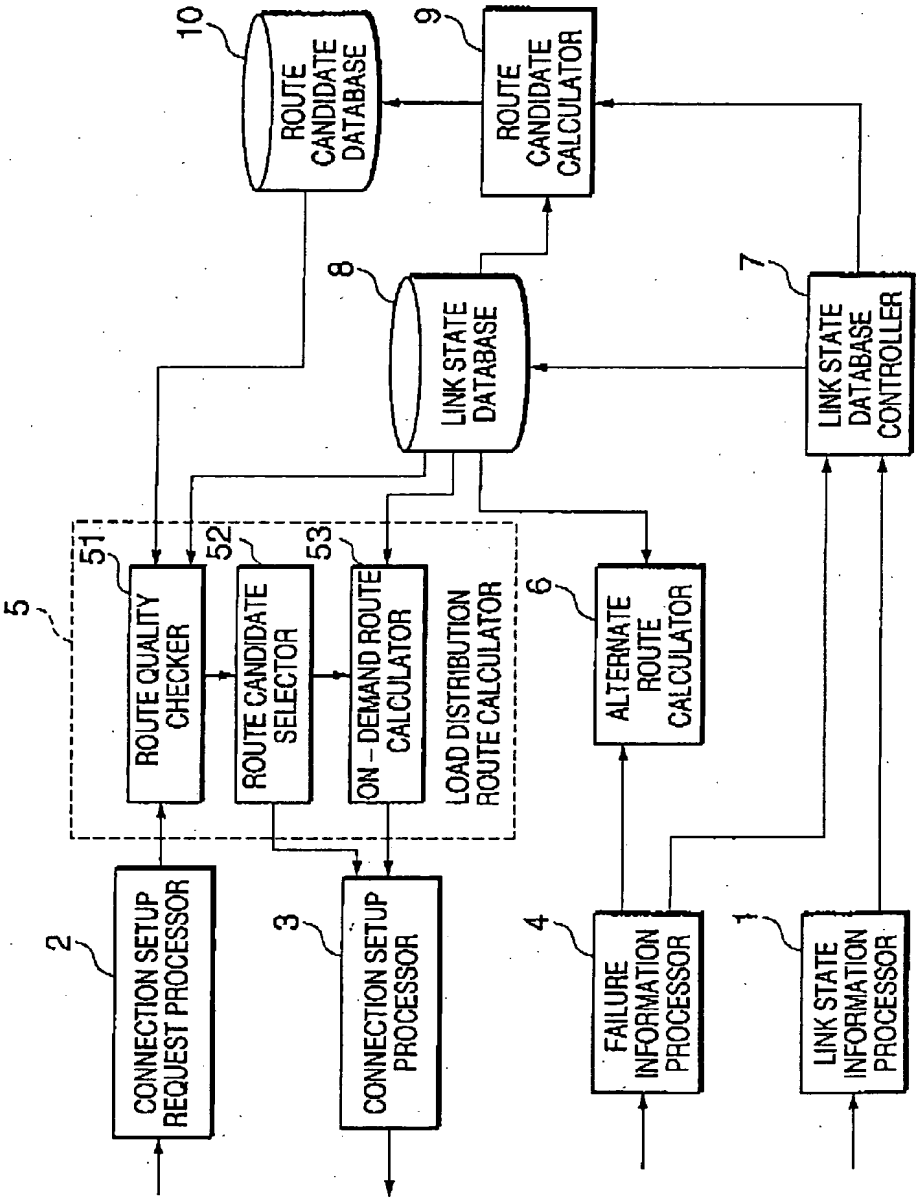
10
ROUTE CANDIDATE DATABASE
9
ROUTE CANDIDATE CALCULATOR
8
LINK STATE DATABASE
7
LINK STATE DATABASE CONTROLLER
5
51
ROUTE QUALITY CHECKER
52
ROUTE CANDIDATE SELECTOR
53
ON-DEMAND ROUTE CALCULATOR
LOAD DISTRIBUTION ROUTE CALCULATOR
6
ALTERNATE ROUTE CALCULATOR
2
CONNECTION SETUP REQUEST PROCESSOR
3
CONNECTION SETUP PROCESSOR
4
FAILURE INFORMATION PROCESSOR
1
LINK STATE INFORMATION PROCESSOR

FIG. 3

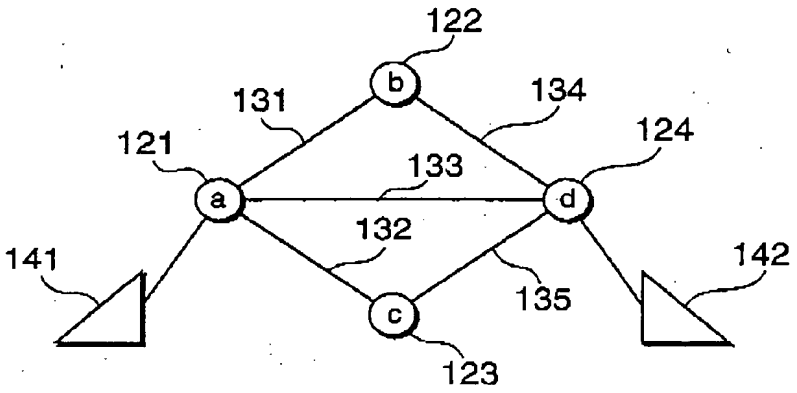
122
131
134
121
124
133
a
d
132
141
142
135
c
123

FIG. 4

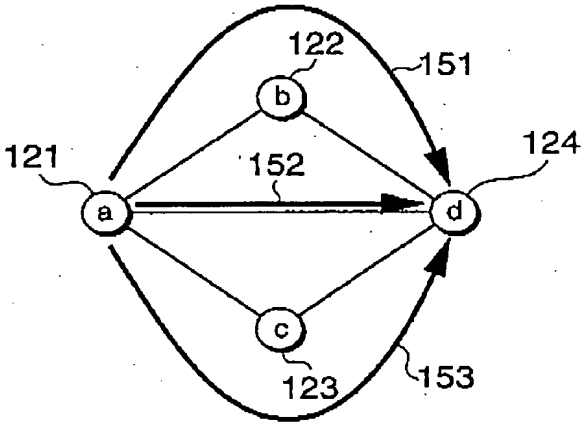
122
151
b
121
124
152
a
d
c
123
153

FIG. 5A

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LINK	AVAILABLE BANDWIDTH	DELAY TIME	DATA ARRIVAL INTERVAL FLUCTUATION
a, b	50 Mbps	5 msec	2 msec
b, d	40 Mbps	10 msec	1 msec
a, d	25 Mbps	3 msec	1 msec
a, c	70 Mbps	6 msec	2 msec
c, d	90 Mbps	5 msec	3 msec
⋮	⋮	⋮	⋮

FIG. 5B

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ROUTE CANDIDATE	AVAILABLE BANDWIDTH	DELAY TIME	DATA ARRIVAL INTERVAL FLUCTUATION
a, b, d	40 Mbps	15 msec	3 msec
a, d	25 Mbps	3 msec	1 msec
a, c, d	70 Mbps	11 msec	5 msec

FIG. 6

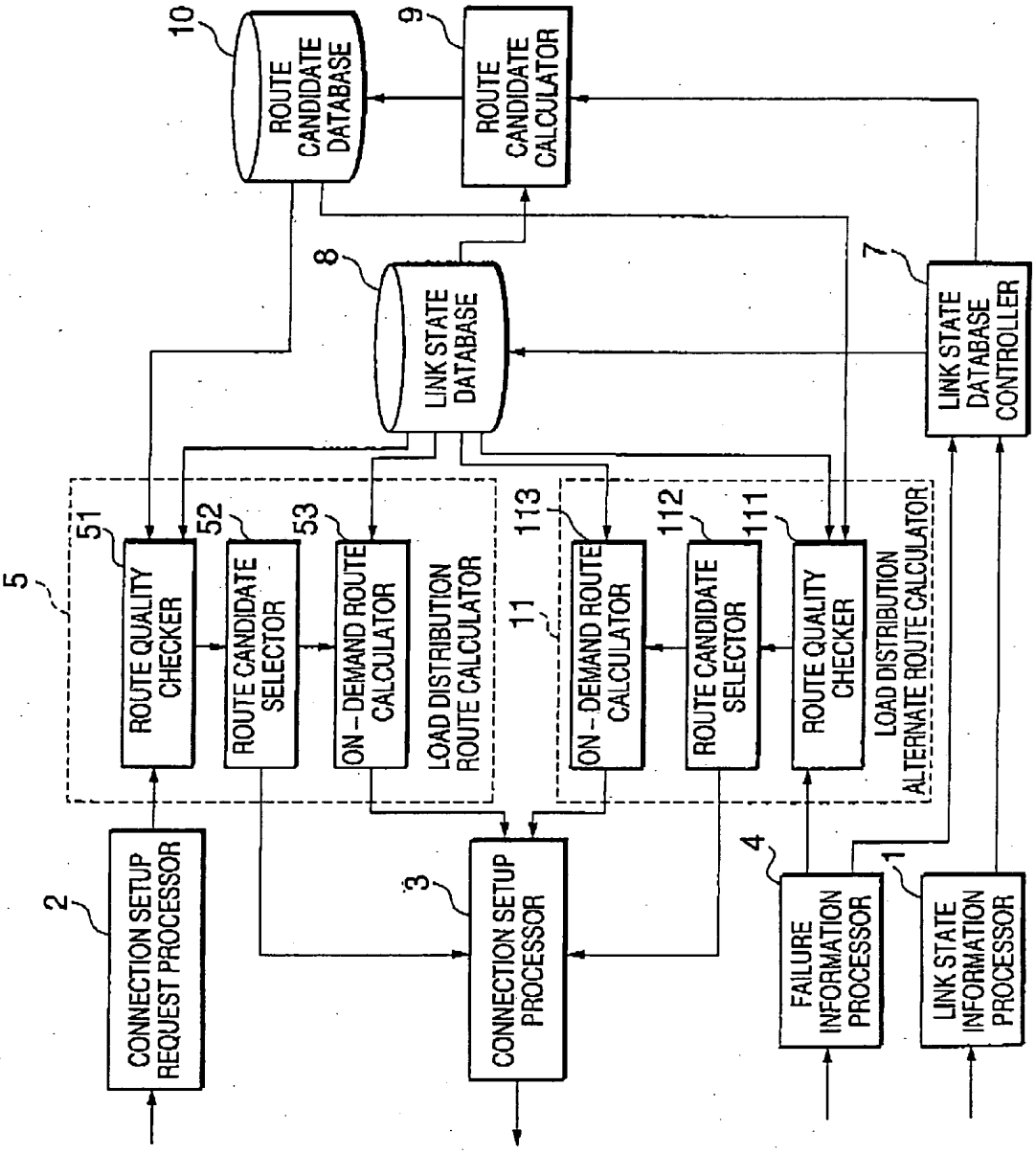
10
ROUTE CANDIDATE DATABASE
9
ROUTE CANDIDATE CALCULATOR
8
LINK STATE DATABASE
7
LINK STATE DATABASE CONTROLLER
5
51
ROUTE QUALITY CHECKER
52
ROUTE CANDIDATE SELECTOR
53
ON-DEMAND ROUTE CALCULATOR
LOAD DISTRIBUTION ROUTE CALCULATOR
11
113
ON-DEMAND ROUTE CALCULATOR
112
ROUTE CANDIDATE SELECTOR
111
ROUTE QUALITY CHECKER
LOAD DISTRIBUTION ALTERNATE ROUTE CALCULATOR
2
CONNECTION SETUP REQUEST PROCESSOR
3
CONNECTION SETUP PROCESSOR
4
FAILURE INFORMATION PROCESSOR
1
LINK STATE INFORMATION PROCESSOR

FIG. 7

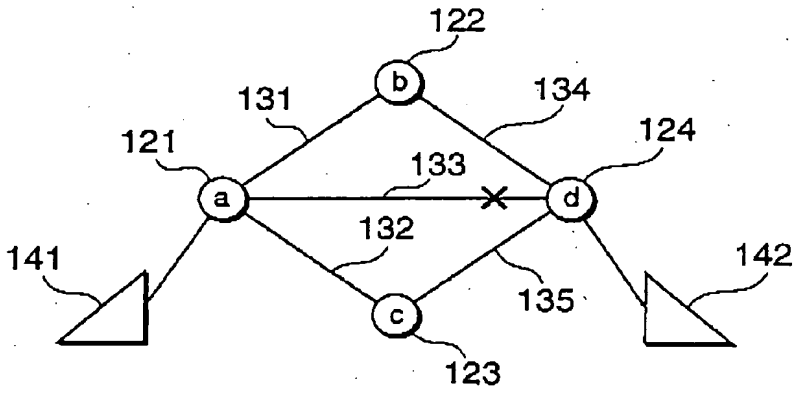

FIG. 8A

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LINK	AVAILABLE BANDWIDTH	DELAY TIME	DATA ARRIVAL INTERVAL FLUCTUATION
a, b	50 Mbps	5 msec	2 msec
b, d	40 Mbps	10 msec	1 msec
a, d	25 Mbps → 0 Mbps	3 msec → ∞ msec	1 msec → ∞ msec
a, c	70 Mbps	6 msec	2 msec
c, d	90 Mbps	5 msec	3 msec
⋮	⋮	⋮	⋮

FIG. 8B

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ROUTE CANDIDATE	AVAILABLE BANDWIDTH	DELAY TIME	DATA ARRIVAL INTERVAL FLUCTUATION
a, b, d	40 Mbps	15 msec	3 msec
a, d	0 Mbps	∞ msec	∞ msec
a, c, d	70 Mbps	11 msec	5 msec